# FISHWAY STATUS REPORT

**Date:** 1/4/2014

**Inspection Period:** 12/29/13 thru 01/4/14

# US Army Corps of Engineers Portland District

# JOHN DAY DAM

JD/WC Project-Fisheries P.O. Box 823

Rufus, Oregon 97050 Phone: 541-506-7860

All JD Fishways are inspected once per day during winter season; frequent monitoring of the PLC displays in SMF Fisheries Office as necessary.

John Day Dam	Inspections	Criteria	Total Number of Inspections: 6 Temperature: 40.3 F
	Out of Criteria	Limit	Secchi: 5.8 Ft.
NORTH FISHWAY			Returned to service after annual maintenance on 12/19/2013; meeting all FPP criteria
Exit differential	0	≤ 0.5′	
Exit Control weirs	0	High setting	High setting is normal for JDN
Count station differential	0	≤ 0.3′	
Weir crest depth	0	1.0' ± 0.1'	
Entrance differential	0	1.0' - 2.0'	AVG 1.5
SOUTH FISHWAY			AWS pumps OOS on 01/04/14 PM in preparation for dewatering on 1/07/14
Exit differential	0	≤ 0.5′	
Exit Control weirs	0	MID setting	MID is normal for JDS
Count station differential	0	≤ 0.3′	
Weir crest depth	0	1.0' ± 0.1'	
South entrance differential	0	1.0' - 2.0'	AVG 1.4
Entrance weir SE1	0	depth (≥ 8')	AVG 8.7
Collection channel velocity	0	1.5 - 4 fps	AVG 3.12
Bay 1 differential	0	1.0' - 2.0'	AVG 1.7
N. Entrance PH(Bay 19)differential	0	1.0' - 2.0'	AVG 1.2
Entrance weir NE1	0	depth (≥ 8')	AVG 8.6
Entrance weir NE2	0	depth (≥ 8')	AVG 8.6
JUVENILE PASSAGE			OOS for winter maintenance since 12/20. RTS in late March 2014
Forebay/bypass conduit differential	N/A	4.0' - 5.0'	
Submersible traveling screens	N/A	visual inspect	
Turbine trashrack drawdown	N/A	<1.5', wkly	
Vert barrier screen drawdown	N/A	<1.5', wkly	
Spill volume	N/A	n/a	
Spill pattern	N/A	n/a	
Turbine Unit Priority	N∖A	per FPP	
Turbine 1% Efficiency	N/A	per FPP	

#### SMOLT MONITORING FACILITY

Operation: SMF OOS since 12/17/13. RTS mid March 2014

Debris: N/A Maintenance:

SMF fully winterized, annual maintenance underway.

SMF CCTV replacement underway.

Research: None

Fallbacks: AVG: 0 MAX: 0 MIN: 0

### OTHER ISSUES:

#### **JOHN DAY**

Birds: See Avian tabs.

122 avian lines are properly installed. Four lines are currently missing; spillway/TSW line broke on 4/12/13. JD Management preparing a plan for the missing lines' replacement before 2014 passage season.

### Operations:

JD North Fishway returned to regular service on 12/19 and it has been meeting the optimal FPP criteria since.

JD South Fishway OOS since 1/04/14. Dewatering scheduled for 1/07/14.

All STSs were removed from MU gatewells for winter maintenance by 19 December. JBS started 1/3 open orifices rotation schedule on 12/20. JBS collection channel is scheduled for dewatering/ inspection in 4 February 2014.

#### Maintenance:

Calibration: 12/18/2013 All JD Fishways' PLCs/ water level sensors were within 0.3' margin of error.

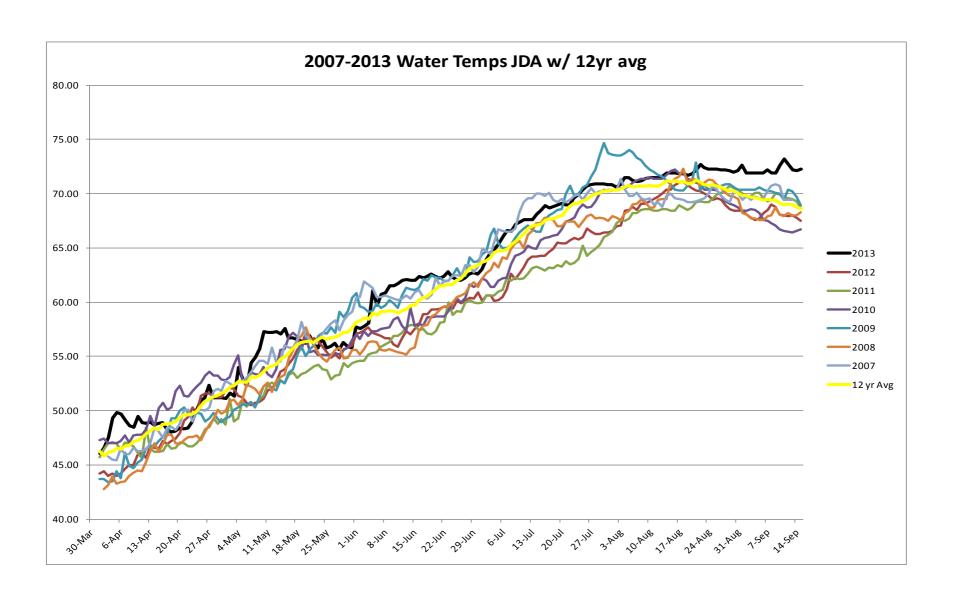
#### Research:

Fish counting at both JD Fishways ended 10/31. Video counting began 11/1 and will continue through the winter.

Adult Salmonids Radio telemetry evaluations are ongoing at both JD adult fishway. University of Idaho crew is in charge of detecting of all adult adult salmonids, which were first tagged at Bonneville Dam.

Glen A. Smith PE OPM John Day/Willow Creek Project

Date: \_\_\_\_ 27-Jan-13



# JDA COLLECTION CHANNEL VELOCITY

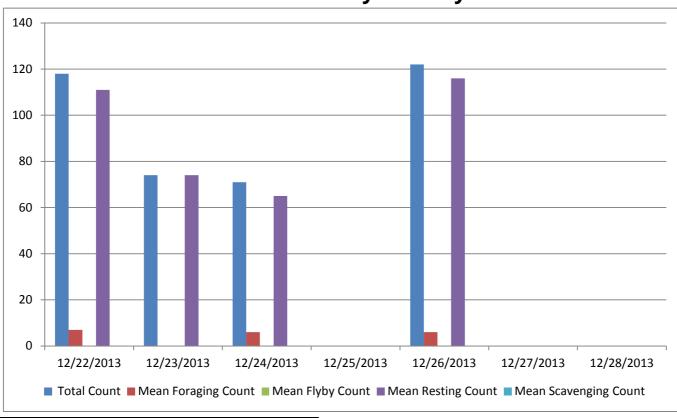
 Date
 21-Dec-13

 By:
 pkr

Bay(s)	Time	Sec.	Velocity (f/s)
0-2	0:01:23	83	2.17
2 - 4	0:02:20	140	3.16
4 - 6	0:03:16	196	3.21
6 - 8	0:04:14	254	3.10
8 - 10	0:05:10	310	3.21
10 - 12	0:06:10	370	3.00
12 - 14	0:07:17	437	2.69
14 - 16	0:08:13	493	3.21
16 - 18	0:08:55	535	4.29

3.12

# **Bird Count by Activity**



		Mean		Mean	Mean
	Total	Foraging	Mean Flyby	Resting	Scavenging
Date	Count	Count	Count	Count	Count
12/22/2013	118	7		111	
12/23/2013	74			74	
12/24/2013	71	6		65	
12/25/2013					
12/26/2013	122	6		116	
12/27/2013					
12/28/2013					

Seasonal High numbers of GULLS in the Forebay and on the WING WALL.

**Christmas** 

**Heavy Fog** 



## John Day:

	Temp:		Secchi:		Fallbacks
Sun	40		6.0		
Mon	40		5.5		
Tues	40		5.5		
Wed					
Thur	40		6.0		
Fri	41		6.0		
Sat	41		6.0		
AVG:	40.3	AVG:	5.8	AVG	
				MAX	
				MIN	

	NE1	NE2	S.Ent	SE1	N.Ent	JBS Diff	Bay1
Sun	8.5	8.5	1.5	8.5	1.5	4.6	1.8
Sun							
Mon	8.8	8.8	1.2	8.9	1.4	4.5	1.5
Mon							
Tues	8.6	8.6	1.4	8.6	1.4	4.5	1.7
Tues							
Wed							
Wed							
Thur	8.7	8.7	1.3	8.8	1.5	4.6	1.6
Thur							
Fri	8.8	8.8	1.3	8.8	1.4	4.5	1.7
Fri							
Sat	8.4	8.4	1.4	8.4	1.5	4.6	1.8
Sat							
AVG:	8.6	8.6	1.4	8.7	1.5	4.6	1.7

**New Years** 

Bay19 1.2

1.1

1.2

1.1

1.1

1.2

1.2